

# talking points

## the criteria and calculations for absolute ratings and improvement ratings (elementary & middle schools – grades 3-8)

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**These talking points provide general information on how the Absolute and Improvement Ratings are calculated for schools enrolling students in grades 3-8. To obtain more technical and specific information on school and district ratings, refer to the Annual Accountability Manual available on the SC Education Oversight Committee Web site at [www.sceoc.org](http://www.sceoc.org).**

- South Carolina's education accountability system centers around one fundamental belief: **ALL children can achieve.**
- The system uses academic achievement standards to push schools and students toward higher performance and focuses on improving teaching and learning so students are equipped with a strong academic foundation.
- Every student is held to the same high standards, and every school and district is accountable for each of its students.
- The system is designed to evaluate annually the progress of each school and school district.
- The 2010 goal states, "South Carolina's student achievement will be ranked in the top half of states nationally. To achieve this goal, we must become one of the five fastest improving systems in the country." The goal is used to establish expectations.
- Continuous improvement is the key to meeting South Carolina's 2010 achievement goal. The ratings system is constructed to increase in rigor over time. The target for individual student performance established by the State Board of

Education is a score of Proficient. A score of Proficient means the student has met expectations and is well-prepared for work at the next grade level.

### Basic Information

- A typical elementary school is defined as a school enrolling students in grades K-5, and a typical middle school enrolls students in grades 6-8.
- Any school that includes a grade on either side of the typical pattern will be viewed as part of that organizational pattern. For example, if a school includes grades K-6, it will be considered elementary. If a school includes grades 5-9, it would be considered a middle school. If a school includes two or more grades on either side of the typical pattern (e.g., 4-8), two report cards are issued.
- Each elementary and middle school receives two performance ratings and notification of AYP

**Absolute Rating** – based on the percentage of students meeting standards on the state's standards-based assessment Palmetto Achievement Challenge Test (PACT) during the school year on which the report card is based.

**Improvement Rating** – based on the progress of longitudinally-matched, individual student data comparing PACT scores during the school year on which the report card is based with the same individual students PACT scores from the previous year.

Five terms are used in the ratings to describe the level of a school's performance:

**Excellent** – School performance substantially exceeds the standards for progress toward the 2010 SC Performance Goal.

**Good** – School performance exceeds the standards for progress toward the 2010 SC Performance Goal.

**Average** – School performance meets the standards for progress toward the 2010 SC Performance Goal.

**Below Average** – School is in jeopardy of not meeting the standards for progress toward the 2010 SC Performance Goal.

**Unsatisfactory** – School performance fails to meet the standards for progress toward the 2010 SC Performance Goal.

### What criterion is used to calculate ratings for elementary and middle schools?

- Student performance on the Palmetto Achievement Challenge Test (PACT), in English Language Arts (ELA), Math, Social Studies, and Science.

### How does the addition of Science and Social Studies scores factor into the Absolute ratings for elementary and middle schools?

This year is the second year of the three-year phase-in of PACT Science and Social Studies into the school absolute ratings. The weighting for Science and Social Studies will increase each year (5 percentage points per year) until the target weightings are achieved. See table below.

## phase-In of PACT science and social studies grades 3-8 absolute ratings

Year	Elementary Schools				Middle Schools			
	ELA	Math	Science	Social Studies	ELA	Math	Science	Social Studies
<b>2004-2005</b>	40%	40%	10%	10%	35%	35%	15%	15%
<b>2005-2006</b>	35%	35%	15%	15%	30%	30%	20%	20%
<b>2006-2007 and beyond</b>	30%	30%	20%	20%	25%	25%	25%	25%

### Which students are included in the elementary and middle school ratings?

- Students enrolled in the school by the 45th day and at the time of testing are included in the school's Absolute Rating.
- Students included in the Improvement Rating are enrolled in the school by the 45th day and at the time of testing, whose data can be matched to the previous year and who have PACT scores for both years even if they attended a different school during the previous year.
- Students with disabilities are included as follows:
  - Students with accommodated administrations will be treated identically to students taking PACT in its standard form in absolute school and district ratings.
  - Students taking alternate assessments will be included in the ratings calculation only at the district level.

- Students taking modified assessments, including “off-level tests,” will be factored into the Absolute Rating according to the test score earned.
- The percentage of students taking PACT assessments on grade level and off grade level is published on the school report card and shown in comparison to the percentages statewide.

- English Language Learners (students with limited English proficiency) are tested in accordance with federal guidelines. Students who are excused from testing by federal rules are excluded from the number of students eligible for testing.

### How are Absolute Ratings calculated for elementary and middle schools?

- Ratings are calculated using a mathematical formula that results in an index reflecting the average performance level of students in the school.
- The index is calculated using the following mathematical formula:

**Step 1** – multiply the points assigned to each of the five PACT score categories (below) by the number of student scores falling into each of those categories for each subject area tested (currently English/language arts, mathematics, science, and social studies.)

The PACT score categories and their assigned points are as follows:

Advanced – 5 points

Proficient – 4 points

Basic – 3 points

Below Basic 2 – 2 points

Below Basic 1 – 1 point

(The Below Basic score category is split into two subcategories, Below Basic 2 and Below Basic 1, to measure performance among low scoring students.)

Test scores for students who should be tested but were not are assigned a point of 0.

**Step 2** – Determine the total number of student scores in each subject area tested (English/language arts, mathematics, science, and social studies).

**Step 3** – Determine an absolute index for each subject area by dividing the sum of the point scores by the number of students tested in each subject.

**Step 4** – Multiply the absolute index calculated for each test by appropriate weight for year (2006) and school level (Elementary or Middle) and add totals.

**Step 5** – Round the sum of the weighted indexes (step 4) to the nearest tenth of a point. The resulting index determines the school’s Absolute Rating as follows:

Year	Excellent	Good	Average	Below Average	Unsatisfactory
2006	3.7 and above*	3.3 – 3.6*	2.9 – 3.2	2.5 – 2.8	Below 2.5
2007	3.8 and above*	3.4 – 3.7*	3.0 – 3.3	2.6 – 2.9	Below 2.6
2008	3.9 and above*	3.5 – 3.8*	3.1 – 3.4	2.7 – 3.0	Below 2.7
2009	4.0 and above*	3.6 – 3.9*	3.2 – 3.5	2.8 – 3.1	Below 2.8
2010	4.1 and above*	3.7 – 4.0*	3.3 – 3.6	2.9 – 3.2	Below 2.9

\* School must meet Adequate Yearly Progress (AYP) objectives for the category, “all students” in each subject area and for percent tested.

**Step 6** – For schools with an Excellent or Good Absolute Rating index, determine if Adequate Yearly Progress (AYP) for the category, “all students” has been met.

If the school’s Absolute Rating is Excellent or Good but the school did not meet AYP for the category, “all students,” the Absolute Rating would be lowered by one level – from Excellent to Good, or from Good to Average.

For example, if a school had an index of 3.7 in 2006 but did not make AYP for the category, “all students,” its rating would be lowered from Excellent to Good. Or if a school had an index of 3.3 in 2006 but did not make AYP for the category, “all students,” its rating would be lowered from Good to Average.

Here is a sample calculation of an Absolute Rating for an elementary school:

## step 1

**Subject Area:**  
**English/language arts**

Score Category	No. of Scores	Score Category			Pts
Advanced	27	x	5	=	135
Proficient	35	x	4	=	140
Basic	110	x	3	=	330
Below Basic 2	42	x	2	=	84
Below Basic 1	17	x	1	=	17
Not Tested	5	x	0	=	0
<b>Total # of Scores</b>	236*			<b>Sum or Weighted Scores =</b>	706

\* Note: Two Limited English Proficient (LEP) students not tested with PACT ELA based on federal guidelines.

**Subject Area:**  
**Mathematics**

Score Category	No. of Scores	Score Category			Pts
Advanced	20	x	5	=	100
Proficient	32	x	4	=	128
Basic	120	x	3	=	360
Below Basic 2	39	x	2	=	78
Below Basic 1	22	x	1	=	22
Not Tested	5	x	0	=	0
<b>Total # of Scores</b>	238			<b>Sum or Weighted Scores =</b>	668

**Subject Area:**  
**Science**

Score Category	No. of Scores	Score Category			Pts
Advanced	10	x	5	=	50
Proficient	25	x	4	=	100
Basic	110	x	3	=	330
Below Basic 2	52	x	2	=	104
Below Basic 1	36	x	1	=	36
Not Tested	5	x	0	=	0
<b>Total # of Scores</b>	238			<b>Sum or Weighted Scores =</b>	620

**Subject Area:**  
**Social Studies**

Score Category	No. of Scores	Score Category			Pts
Advanced	25	x	5	=	125
Proficient	37	x	4	=	148
Basic	112	x	3	=	336
Below Basic 2	40	x	2	=	80
Below Basic 1	19	x	1	=	19
Not Tested	5	x	0	=	0
<b>Total # of Scores</b>	238			<b>Sum or Weighted Scores =</b>	708

**steps 2 & 3**

Test	Sum of Point Scores	÷	Number of Students Tested	Subject Area Absolute Index
English Language Arts	706	÷	236	= 2.9915
Mathematics	688	÷	238	= 2.8907
Science	620	÷	238	= 2.6050
Social Studies	708	÷	238	= 2.9747

**step 4**

Test	Subject Area Absolute Index	x	Elementary School Test Weight for '06	
English Language Arts	2.9915	x	.35	= 1.0470
Mathematics	2.8907	x	.35	= 1.0117
Science	2.6050	x	.15	= 0.3907
Social Studies	2.9747	x	.15	= 0.4462
			<b>Sum of Weighted Indexes</b>	2.8956

## step 5

*Sum of Weighted Indexes=2.8956*

*Rounded: 2.9*

*Absolute Rating in 2006: Average*

Note: This school's index of 2.9 corresponds to an Average Absolute Rating for the year 2006. From 2007 to 2010, a 2.9 index becomes Below Average.

## step 6

Since this school's Absolute Rating is Average, Step 6 does not apply.

### How are Improvement Ratings calculated for elementary and middle schools?

- The improvement ratings are calculated using a mathematical formula that results in an index.
- Only PACT scores of students qualifying for inclusion in the Improvement Rating are used in the calculation.
- Students included in the Improvement Rating are those enrolled in the school by the 45th day and at the time of testing, whose data can be matched to the previous year, and who have PACT scores for both years even if they attended a different school during the previous year.
- The Improvement Rating index is calculated using the following mathematical formula:

**Step 1** – multiply the points assigned to the PACT score categories by the number of student (those qualifying for inclusion in the Improvement Rating) scores falling into each of those categories for each subject area tested (currently English/language arts, mathematics, science, and social studies) during the school year for which the report card is based.

<b>PACT Performance Levels</b>	<b>Range of Point Weights for calculating Improvement Rating*</b>
Advanced	5 points
Proficient	4 –4.75 points
Basic	3 –3.75 points
Below Basic 2	2 –2.75 points
Below Basic 1	1 –1.75 points
Not Tested	0

\* Scale scores and their assigned point weights vary according to grade level and subject area tested. Tables listing scale scores and their assigned point weights are in the 2005-06 Annual Accountability Manual available on the SC Education Oversight Committee Web site at [www.sceoc.org](http://www.sceoc.org) <<http://www.sceoc.org>>. The appropriate point weight corresponding to each student's ELA, Math, Science, and Social Studies PACT score is determined from these tables, and the point weights are summed and averaged as in the calculation of the absolute index. Dividing the PACT performance levels into intervals helps identify small achievement changes for individual students over a period of time.

**Step 2** – Add the points for the PACT score categories of qualifying students for each subject area tested. The total is the sum of weighted scores for each subject area.

**Step 3** – Determine the total number of student scores in each subject area tested (English/language arts, mathematics, social studies, and science).

**Step 4** – Determine the subject area index by dividing the sum of weighted scores (step 2) by the total number of scores (step 3) for each subject area.

**Step 5** – Determine weighted index for the subject area and the grade level by multiplying the subject area index from step 4 by the weighting in the table below. As with the Absolute Ratings, the subject areas receive different weightings in elementary and middle schools beginning in 2005, but the weightings are not phased in over time. The following table lists the subject area weights used for calculating the Improvement Rating index for elementary and middle schools.

Year	Elementary Schools (Grades 3-5)				Middle Schools (Grades 6-8)			
	ELA	Math	Science	Social Studies	ELA	Math	Science	Social Studies
2004-2005 and beyond	30%	30%	20%	20%	25%	25%	25%	25%

### Phase-In of PACT Science and Social Studies Grades 3-8 Absolute Ratings

**Step 6** – Add weighted indexes from step 5 for each subject area – do not round sum.

**Step 7** – Using these same students, calculate a second weighted index in the same manner (steps 1 through 6) using their PACT performance from the year prior. This is the index for the prior school year.

**Step 8**– Calculate the difference between the indices by subtracting the index for the year prior from the index for the year on which the report card is based. Round the difference to the nearest tenth of a point. For example, if the current year's index is 3.57 and

the prior year's index was 3.25, the difference is 0.32. Rounded to the nearest tenth of a point, 0.32 becomes 0.3.

**Step 9** – The resulting index determines the Improvement Rating in accordance with the following values:

Rating	Improvement Index
Excellent	0.4 or greater
Good	0.3
Average	0.1 – 0.2
Below Average	0.0
Unsatisfactory	-0.1 or less

### Here is a sample calculation of an Improvement Rating for an elementary school:

Index for current school year: 3.34

Index for prior school year: -3.62

Difference: -0.32

Round to: -0.3

*Improvement Rating: Unsatisfactory*

### Adjustments to the Improvement Rating:

- A school's Improvement Rating is adjusted upwards one rating level, for example from Average to Good or from Good to Excellent, if it has experienced exceptional achievement gains among students belonging to demographic groups which historically have underachieved in South Carolina schools (HUGS). This adjustment to the Improvement Rating is intended to recognize and reward schools which are reducing the achievement gap.
- HUGS are specific groups of students who historically have not achieved as well as the majority student group. HUGS include African-American students, Hispanic students, Native American students, students participating in the free or reduced price federal lunch program and students with non-speech disabilities.
- The gain for the identified groups must be at least one standard deviation higher than the achievement gain for all students statewide. If a school accomplishes this achievement, a notice is printed on the front page of its report card immediately below the Improvement Rating.

### Improvement Ratings for schools sustaining high achievement are established as follows:

- If a school is rated Excellent for absolute achievement for both years, the school will receive an Improvement Rating of Good and if the school's improvement index for all students is a positive number (i.e., greater than zero), the school's Improvement Rating will be elevated to Excellent. Schools achieving an absolute index of 4.8 or higher for two consecutive years will be awarded an Excellent Improvement Rating.

### A Note About AYP

**Adequate Yearly Progress (AYP)** – As required by the United States Department of Education through passage of the No Child Left Behind legislation, a notice about the school's status of adequate yearly progress is provided. AYP specifies statewide targets for all students in each student subgroup: racial/ethnic, economic, disability, limited English proficiency, and migrant status.

For specific questions about AYP, please contact the State Department of Education at [www.myschools.com](http://www.myschools.com)